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Superfund Record of Decision (EPA Region 1) Beacon Heights Site, Beacon Falls, Connecticut September 1985. Appendix D. Community Relations Responsiveness Summary

(U.S.) Environmental Protection Agency
Washington, DC

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U.S. Department of Commerce
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Superfund
Record of Decision:

APPENDIX D - COMMUNITY RELATIONS RESPONSIVENESS SUMMARY

BEACON HEIGHTS SITE
BEACON FALLS, CONNECTICUT

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See also PB86-134004.Portions of this document are not fully legible.

The responsiveness summary for the Beacon Heights Site documents for the public record concerns and issues raised during remedial planning, comments raised during the comment period on the feasibility study, and the responses of EPA to these concerns.

KEYWORDS: *Earth fills, *Industrial wastes, *Hazardous materials, *Superfund program, *Beacon Heights.

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Superfund
Record of Decision:

COMMUNITY RELATIONS RESPONSIVENESS SUMMARY
BEACON HEIGHTS SITE
BEACON FALLS, CONNECTICUT

Introduction

This responsiveness summary for the Beacon Heights Site documents for the public record concerns and issues raised during remedial planning, comments raised during the comment period on the feasibility study, and the responses of EPA to these concerns.

Concerns Raised Prior to the Feasibility Study Comment Period

The predominant concern expressed by many members of the community was the immediate need for a new water supply for affected residents. Citizens expressed fear that their drinking wells might be contaminated leading to adverse health effects. Cleaning up the contamination at the site was viewed by many residents as a secondary activity, to take place after a new water supply was operating. Residents of two houses on Skokorat Road, where wells were found to be contaminated, expressed concern about the contaminated water but were more concerned about why they were not notified sooner that their water was unsafe to drink.

In response to concerns raised by some residents over prompt notification, EPA made certain that all new information (i.e., verified well test results) was immediately channelled through the State Health Department and the First Selectman of Beacon Falls, Leonard D'Amico.

Residents and local officials also expressed concern over the instability of the landfill due to its history of accepting unknown quantities of industrial waste. Several members of the community wanted to know what materials were in the landfill and how great a threat they posed.

In order to keep residents informed about the site, EPA set up an information repository at the Beacon Falls Town Hall and Public Library. EPA also informed concerned citizens and officials of the many dangers involved in direct onsite testing of the landfill because of the toxic nature of some of the chemicals buried in the landfill.

Community Relations Activities Conducted by EPA

Community relations activities were conducted by EPA to elicit citizen input and address concerns over remedial actions. Activities that took place include the following:

- A Community Relations Plan was (CRP) prepared by EPA based on interviews with town residents and officials in September, 1983.
- EPA briefed local officials by phone and in-person as new information concerning the Beacon Heights site became available.
- A public meeting was held on March 26, 1984 by EPA at Laurel Ledge School in Beacon Falls to explain the work plan for the remedial investigation (RI) and the feasibility study (FS).

- An information repository was established in the Beacon Falls Town Hall and Public Library containing press releases, Remedial Action Master Plan (RAMP) fact sheets, engineering reports, RI/FS, and public hearing transcript.

- Press releases were issued, including results of the RI on April 25, 1985 and results of the FS on May 20, 1985.

- A Feasibility Study was released on May 20, 1985 for public review and comment.

- A second informational public meeting was held on June 5, 1985 by EPA at Laurel Ledge School in Beacon Falls to explain the results of the remedial investigation and feasibility study.

- A public hearing was held on June 11, 1985 by EPA at Laurel Ledge School in Beacon Falls to record comments and suggestions on the feasibility study for the Beacon Heights Landfill.

- The public comment period closed on June 14, 1985.

Concerns Raised During the Comment Period

The public comment period began on May 20, 1985 with the release of the feasibility study report. During the comment period, a public meeting was held on June 5, 1985, attended by approximately 30 people, to present results of the RI/FS and to answer questions from the public concerning the cleanup alternatives. On June 11, 1985 a formal public hearing was held to record comments on the cleanup alternatives for the Beacon Heights Landfill. Nine comments from public officials and local citizens were recorded at the hearing. These comments along with written comments received by EPA and concerns generated at the public meeting are summarized in the following section. In addition, the following section provides a summary of all Potentially Responsible Party (PRP) comments received by EPA.

Index to Community Comments

1. Providing New Water Supply
2. Onsite Incineration
3. Notification
4. Landfill Cleanup
5. Groundwater Cleanup
6. Monitoring
7. Offsite Contamination
8. Health Risks

COMMUNITY CONCERN	RESPONSE
1. Providing New Water Supply	
The overriding request of many citizens was to provide a new water supply first, clean up the site later. Getting clean water to affected and potentially affected citizens is their highest priority.	EPA intends to "fast track" the design and construction of the municipal water extension separately from the site closure design and construction.
Several citizens stated that Alternative 9 is the only alternative that will ensure that all residents are drinking uncontaminated water.	To ensure protection of public health and to account for uncertainties which exist in the understanding of groundwater contamination, the waterline extension will encompass all affected and potentially affected areas with a factor of safety to account for unknowns.

COMMUNITY CONCERN	RESPONSE
2. Onsite Incineration A major concern expressed by several citizens was that Alternative 2, Onsite Incineration, could lead to wastes from other areas being brought onsite for incineration purposes and the incinerator becoming a regional incinerator. These citizens were opposed to other wastes being treated onsite.	Onsite incineration was eliminated from consideration during the detailed evaluation of alternatives based on cost considerations and time required for implementation. However, the intent of Alternative 2 was to process only the Beacon Heights wastes and not to build a commercial disposal facility.

COMMUNITY CONCERN	RESPONSE
3. Notification Several residents felt that they were not promptly and properly notified that their wells were contaminated. One resident stated that he read of the contamination in the newspaper prior to being personally notified. Residents questioned why they could not be warned immediately if the water may be contaminated and unsafe to drink, instead of waiting for complete verification and validation of the results.	Communication to residents is through the State Department of Health Services, the Agency charged with protecting the health of Connecticut residents. Analytical results must be validated to ensure their legitimacy prior to release. Since the contaminants found present a risk from long term consumption, the additional 3-4 weeks to validate preliminary results were warranted to ensure that the contamination was real and not the result of laboratory or sampling problems.

COMMUNITY CONCERN	RESPONSE
4. Landfill Cleanup One citizen was concerned that contamination at the site cannot really be controlled unless the entire site is excavated and the contents of the landfill are disposed of offsite.	Site contamination can be controlled without complete excavation of all wastes. Due to the volume of wastes at the site (much of which is municipal waste) complete excavation and offsite disposal would be a very expensive alternative to implement. It is questionable if sufficient landfill space can be made available to implement this action within a reasonable time period. In addition to being prohibitively expensive, offsite disposal would cause major short term impacts due to heavy truck traffic, air emissions during excavation, and the length of time required for implementation. Futhermore, the use of a RCRA-type cap will create an impermeable barrier over the landfill and will minimize the volume of leachate that is generated from the site. A leachate collection system will control contamination emanating from the site, and when coupled with the provision of an alternate water supply, this system will effectively remediate the site problems.

COMMUNITY CONCERN	RESPONSE
5. Groundwater Cleanup One citizen felt that Alternative 11 is the most environmentally sound method to ensure against any future and long-range migration of contaminated groundwater to areas not served by a public water source.	The technical difficulties in implementing this alternative are several owing to the nature of the fractured bedrock and depth of contamination. Flow in the bedrock is through an extensive fracture system that must be totally intercepted to extract the groundwater. When the municipal water line is extended, the health threat resulting from groundwater contamination will be removed. Additional monitoring will be done to determine if groundwater contamination is migrating further.

COMMUNITY CONCERN	RESPONSE
6. Monitoring A citizen was concerned whether residents can be confident that wastes won't seep out after the monitoring program is completed.	A monitoring program of 30 years is proposed. It is expected that this is a sufficiently long period to evaluate the steady-state conditions that should develop following the implementation of remedial actions. After the site is capped the leachate generation should reduce quickly. Within a period of several years the rate may reduce further as the wastes within the landfill are dewatered. The resulting effect on the groundwater to reduce contaminant concentrations will lag somewhat, owing to the time it takes for flow to travel through the aquifer, but would be detected within the 30 year period. At the end of 30 years, the levels of contamination will be reevaluated to determine the need for additional monitoring.

COMMUNITY CONCERN	RESPONSE
7. Offsite Contamination Several citizens expressed concern that there is no way to tell whether wells just outside the immediate contamination area might be affected through further groundwater seepage. The feasibility study states that contamination was detected upgradient of the site. More testing should be done to explore the possibility of offsite sources of contamination. Citizens were concerned why wells were not being tested upgradient of the site. More information should be gathered on the possibility of deep bedrock contamination.	Results of the remedial investigation (RI) report indicate that some low level contamination was found in wells upgradient from the site. These wells were very close to the landfill and may have been contaminated by a mounding effect from the landfill, or were not truly upgradient wells (MW-3). Contaminant levels were very low and may have been a result of laboratory or sampling equipment. Although the results of the study do not indicate a major source of upgradient contamination, a continued monitoring program for the site would include the installation of additional upgradient monitoring wells and deep bedrock wells. Monitoring wells will be placed in the area to the northwest of the site where the public water supply is not available (Cook Lane).

COMMUNITY CONCERN	RESPONSE,
8. Health Risks	
Several citizens commented about the potential health risk of drinking contaminated water.	A chemical analysis must be completed on the municipal water supply to actually compare it with the current well water. Municipal water supplies are subject to quality criteria and monitoring.
A citizen felt that the impact on residents in the affected area cannot be measured in numbers alone. Mental anguish is difficult to measure. Equally difficult to assess is the impact on property values. These two factors can be alleviated by bringing public water to the effected and extended area.	The risks associated with ingesting the well water were identified in the feasibility study. Only 2 samples from residences along Skokorat Road were identified as presently containing contaminants above levels that are considered safe. Those residents whose wells were contaminated with benzene were advised to discontinue use of their water supply for ingestion. Contaminants found in other wells were not determined to be above safe levels from an acute (short term) or chronic (long term) exposure scenario at the present time. Residents with health problems were advised at the public meetings to discuss these problems with the Connecticut Department of Health Services and/or their physicians.
A citizen was concerned over who sets the standards for allowable hazardous concentrations of chemicals? Why are the State and Federal standards different? Why are the standards always changing?	The Federal government sets standards for pollutants in various media (e.g., air, surface water, drinking water) through its process of issuing regulations. A state may adopt these standards or may set more stringent standards due to differences in philosophy, consideration of special state needs, or state legislative requirements.

COMMUNITY CONCERN	RESPONSE,
8. Health Risks (continued)	Regulatory standards do not exist for many hazardous chemicals. In the absence of regulations, both Federal and State governments may issue guidelines as an interim control measure based on existing information on chemical toxicity, persistence, likelihood of exposure, analytical detection limits and other factors. Standard setting is an evaluationary process because the understanding of chemicals and their effects on human health is also constantly evolving.

Index to State Comments

1. Providing New Water Supply
2. Onsite Incineration
3. Interpreting and Conveying Data
4. Landfill Cleanup
5. Access
6. Monitoring

STATE CONCERN	RESPONSE
1. <u>Providing New Water Supply</u> Several officials representing the State expressed the opinion that the first responsibility is to provide a safe public water supply as quickly as possible. The State supports Alternative 9 because of the potential for contamination of private wells within downgradient proximity of the landfill.	EPA Agrees that provision of a safe water supply should take preference over landfill closure and intends to phase in this aspect of the cleanup of accomplish it as rapidly as possible. EPA also supports the extended waterline, Alternative 9.

STATE CONCERN	RESPONSE
2. Incineration	
Similar to the concerns expressed by the citizens, the State opposes onsite incineration. The potential for further environmental damage during the burning process and the possibility that the area can be used in the future to incinerate hazardous waste brought in from other sources is too great for this plan to be considered.	Incineration has been ruled out on the basis of cost and time for implementation, thus obviating these concerns.

STATE CONCERN	RESPONSE
3. Interpreting and Conveying Data	
The State thinks that EPA should make sure proper resources are available to interpret data received at the dump site. This data needs to be quickly, accurately and clearly passed on to the community. Regardless of which solution is selected, a system should be available to feed back useful information to the residents.	EPA will disseminate information to the affected community through its community relations program of formal and informal meetings, press releases, fact sheets, and other means of communication.

STATE CONCERN	RESPONSE
4. <u>Landfill Cleanup</u> The State expressed the concern that remedial measures designed to divert groundwater and surface water will be ineffective. Therefore, the contents of the Betkoski Dump should be excavated and placed atop the main landfill. The landfill should then be regraded and covered with an impermeable cap.	EPA agrees that diversion of groundwater and surface waters around the Betkoski Dump area is not feasible and that these wastes should be excavated and consolidated with the larger landfill. This will also make possible a perimeter leachate collection system which encompasses all waste deposits. The contents of the Betkoski Dump will be placed atop the main landfill prior to placement of any cap. Alternative 6, placement of a soil cover, was revised to include this measure also.

STATE CONCERN	RESPONSE
5. Access	
The State thinks that access to the landfill should be restricted. Children and other unauthorized entrants must be prevented from going onsite.	Access to the landfill will be restricted to prevent contact with materials on site and to prevent vandalism of site facilities (treatment facilities, site cap, etc.) following implementation of remedial actions. The site area and additional working areas required for remediation will be fenced.

STATE CONCERN	RESPONSE
6. Monitoring	
The State commented that there needs to be a monitoring system in place for those residents who are not connected to a public water supply and are potentially at risk. Future studies and monitoring of offsite groundwater migration should be conducted.	The extension of the public water supply will include the area identified as the extended area in the FS report. This limit includes areas that are currently not affected by contamination above safe levels but could be affected in the future. Extension of the waterline includes provisions for installation of monitoring wells in areas outside the study area to the northwest of the site that currently do not have public water supply available. These areas are primarily along Cook Lane. The public water line will not be extended to these areas initially because no data is available to indicate they are contaminated and because concentrations should be diluted at this distance, which is approximately one mile from the site.

Index to PRP Comments

1. Offsite Disposal (pp. 5-11)*
2. Onsite Incineration (pp. 12-15)*
3. Landfill Adjacent to Site (pp. 15-20)*
4. RCRA Cap With Leachate Collection and Treatment (pp. 20-21)*
5. Soil Cover and Leachate Collection and Treatment (pp. 22-28)*
6. Public Water Supply Extension (pp. 28-29)*
7. Long-Term Monitoring (pp. 29-30)*
8. Groundwater Treatment (pp. 30-31)*

*For the full text of comments refer to the Written Comments of: The Beacon Heights Generators Committee, prepared by the Beacon Heights Generators Committee and the consulting firm of Malcolm Pirnie, Inc. ("MPI").

PRP CONCERN	RESPONSE
1. Offsite Disposal	
Does not meet Federal requirements: o Transportation from one CERCLA site to another is not consistent with intent of CERCLA. o Landfilling of wastes is not consistent with requirements of and policy underlying the Hazardous and Solid Waste Amendments of 1984 or EPA's Policy under RCRA.	CERCLA prohibits the use of offsite disposal remedies unless it is cost effective, it is necessary to protect public health, welfare, or the environment, or it creates new disposal capacity. The Beacon Heights situation does not meet these statutory requirements and offsite disposal is not the selected remedy.
Offsite disposal is technically impractical and will cause adverse environmental impacts: o No hazardous waste landfills located in Connecticut. o Limited space in New York and New York has strict limits on total organics in waste. o Other states available (Ohio, Indiana, and South Carolina) but disposal will take much longer, cost much more and be a greater safety hazard. o Excavation and long-distance transport would take much longer than projected. o Would result in uncontrolled releases when site is uncovered for excavation. o Contact of stormwater with exposed wastes will increase during excavation, forming leachate and possible groundwater contamination.	If the wastes were to be exhumed, it is possible that certain wastes would be encountered which are now or will be prohibited from land disposal in the present form. Rehandling to first treat or stabilize the wastes would be required prior to landfilling: this cannot be predicted based on existing information. Many of the hazards associated with excavation of the wastes and offsite disposal were considered during the preparation of the feasibility study and were implied in the FS report. The large volume of wastes at the Beacon Heights Landfill Site make any offsite disposal technology a limited option based on the risks involved with exposing the wastes, hazards of long-distance transport, and the potential lack of available landfill space, this alternative does have serious contraints as identified in the FS. The costs for implementing this alternative are excessive compared to benefits that can be achieved

PRP CONCERN	RESPONSE.
1. <u>Offsite Disposal</u> (continued) o Potential risks excavating hazardous waste unknown. o Cannot move all wastes by bulk handling method as described in FS. o Drums will be uncovered that need testing, transporting and disposal. o Pooled or ponded free liquids will be encountered--cannot be placed in a landfill and will require offsite processing and treatment. o Costs are underestimated by $20-$30 million.	through placing a RCRA cap. Evaluation of this alternative was included to comply with EPA guidance to evaluate offsite disposal, storage, or destruction technologies. It has been screened out as a viable alternative.

PRP CONCERN	RESPONSE
2. Onsite Incineration	
Institutional issues should be considered and may pose significant drawbacks to onsite incineration: o Permits must be obtained from Connecticut Department of Environmental Protection (CDEP). o Formal siting application must be submitted to state's siting council. The council has not sited a new facility to date. o Construction and testing phase for incinerator may take 3-5 years. o Disposal of incinerated residue in new RCRA landfill is not encouraged under RCRA. o New land must be purchased to locate new landfill. o FS does not address new landfill in terms of ownership, financial assurance, property acquisition and buffer zones.	This alternative was screened out as a result of costs, and public opinion against this alternative.*
Technical impracticalities for landfill discussed under offsite landfill also apply here (i.e., exposure risks, leachate formation). Other technical problems also exist: o FS does not address adverse effects from emissions from incinerator. o Need for scrubber and scrubber wastewater disposal is not discussed.	As outlined under Alternative 1, offsite disposal, many of the points identified by the PRPs were considered during preparation of the feasibility study and were addressed in the report, although not elaborately. This alternative was included to comply with the FS guidance documents to identify alternatives that attain all applicable or relevant Federal public health or environmental standards, guidances, or advisories and to evaluate an alternative that provides destruction of the waste materials. The Connecticut Water Quality standards do allow for variances on a case by case basis. EPA recognizes that such a variance would be required for any discharge to Hockanum Brook or its tributaries.
	*NB. "CERCLA compliance with other environmental laws" policy states that Superfund remedies need only comply with the technical requirements of federal statutes. Neither state nor federal permits need be obtained.

PRP CONCERN	RESPONSE

2. Onsite Incineration (continued)

   o Discharge of even highly treated leachate from landfill into Hockanum Brook is prohibited by Connecticut Water Quality Standards and Criteria.

PRP CONCERN	RESPONSE
3. Landfill Adjacent to Site Construction of a RCRA landfill adjacent to site is not technically practical to implement and presents significant adverse environmental, health, and safety risks: o High health risk from exposure to waste during excavation. o High cost but doesn't provide greater protection to public health and the environment than Alternative 3 or 6. o Similar health and safety risks as those presented under offsite disposal. o FS overestimated level of protection provided by leachate treatment system under Alternative 5. It will not meet primary drinking water standards for chloride or nitrate nitrogen. o Discharge to Hockanum Brook is prohibited. o Onsite RCRA landfill not consistent with Policy of Hazardous and Solid Waste Amendments of 1984 and EPA Policy under RCRA which discourages landfilling of hazardous waste. o Prohibition against siting landfills in Connecticut. o Must purchase property. o Given a reasonable estimate of construction activity and traffic, would take 2 years to construct landfill bottom, 4 years to construct cap, and 3-4 years to move waste. This lengthy	Development of an onsite landfilling alternative was used to satisfy many of the requirements of the FS guidance process. Several of the comments from the PRPs were discussed in the feasibility study and are valid concerns associated with implementation of this alternative. These concerns include the risks created by exposure of the wastes, the time period required for construction, and necessary purchase of additional property. Although landfilling of hazardous wastes may be discouraged under RCRA, the focus of the onsite RCRA landfill alternatives was to provide an onsite containment measure in contrast to onsite destruction technologies (incineration) that are more expensive and have adverse environmental impacts. By containing the wastes within a fully lined and capped system where all leachate can be collected and managed, this alternative would provide greater protection to the public health and environment than the capping Alternatives 3 and 6. However, difficulties in obtaining property, materials for construction, and time to implement, do not warrant the costs for Alternatives 4 and 5 ($38 million) versus the appreciable benefits that can be achieved for the cost of placing a RCRA cap in Alternative 3 ($15 million) since Alternative 3 adequately protects public health and the environment.

PRP CONCERN	RESPONSE
3. Landfill Adjacent to Site (continued) time greatly increase environmental and health risks. o Estimate on clay is too low. Low permeability clay would cost $25 per cubic yard in New York. This would increase costs $1.93 million for both Alternatives 4 and 5. o FS fails to mention costs of moving free liquids--could add $1 million to total costs. o FS does not address excavation and removal costs for liquid-filled drums.	Based on further discussion with Connecticut regulatory agency personnel, it does appear that discharge to Hockanum Brook may be allowed under its classification as a B/A stream. Discharge to Class B streams may be allowed when the treated discharge is an improvement over the quality of current discharges and will help to improve the stream class from B to A. The inplace cost of clay used in the estimate was approximately $20 per cubic yard, a direct cost prior to the addition of contingencies. The total cost for clay is derived from elements listed under material, labor, and equipment costs. The extent of free liquids within the wastes cannot be adequately determined prior to testing and sampling which will be included as part of the design. The additional costs for excavation and disposal of free liquids was addressed in the final FS in the sensitivity cost analysis. Excavation of the entire landfill contents would result in increased air emissions of volatile organics. However, exposure could be controlled by use of proper personnel protective equipment by the workers, an air monitoring network to determine periphery exposure levels in conjunction with a contingency plan, and a controlled work sequence.

PRP CONCERN	RESPONSE
3. Landfill Adjacent to Site (continued)	The 1984 RCRA Amendments do discourage landfilling. However, creation of a new landfill onsite or on adjacent property would not be inconsistent with those Amendments since it would merely upgrade the already existing landfill. Purchase of adjacent property for a RCRA landfill would be the responsibility of the State of Connecticut. Current EPA policy on feasibility studies does require that land acquisition costs be included in capital cost estimates. However, the additional cost would be relatively insignificant in comparison to the $15 million capital cost for this alternative. It is unclear if the "prohibition" on new landfills would apply to construction of a RCRA landfill adjacent to the existing Beacon Heights landfill. Under present EPA policy, remedial actions do not have to comply with the procedural and administrative aspects of other environmental laws, i.e., state siting. Construction of a new landfill would be a lengthy process requiring several years. The 11-12 years estimated by the PRPs neglects the ability to conduct discrete items concurrently.

PRP CONCERN	RESPONSE
4. <u>RCRA Cap With Leachate Collection and Treatment</u> Eight-foot RCRA cap is technically impractical: o One year construction would require 18 trucks per hour which is not feasible. o Cap would realistically take 4 years to construct. o Prohibition against discharge to Hockanum Brook. o Clay costs are underestimated by $2 million. o Leachate collection system cost is inconsistent with the estimate in Alternative 6. o Overall costs underestimated--not a cost-effective remedy.	The placement of a RCRA-approved cap would provide a cost-effective alternative for minimizing the generation of leachate from the landfill and subsequent contamination of the groundwater. The purpose of a RCRA cap is to place an impermeable layer that minimizes the degree of infiltration. The concept of a RCRA-approved cap allows for variability in the design and use of materials to create this impermeable layer. The proposed design (reduced from 8 feet to 6 feet thick) used both clay and synthetic membrane layers to illustrate the cost and design of a cap that could provide the greatest reduction of infiltration. Additional layers include a gas flow zone to vent methane gas from the landfill and surface drainage layers to direct runoff from the landfill. A large volume of material, approximately 450,000 cubic yards, would be required at the site for construction of a cap and liner. The increase in truck traffic may require upgrading of the local roads. The time required to obtain and transport the construction materials to the site may be several years. The cost for the use of clay in the cap was properly estimated and is derived from cost elements listed under materials, labor, and equipment. This cost accounts for hauling from within a 50-mile radius from the site.

PRP CONCERN	RESPONSE
4. RCRA Cap With Leachate Collection and Treatment (continued)	The cost for leachate collection systems was re-evaluated in the final FS and revised. The cost is essentially the same for both capping alternatives. Discharge of treated leachage to Hockanum Brook may be allowed in this case when the treated discharge will be improved over the quality of current discharge and will help to improve the quality of the stream from Class B to Class A.

PRP CONCERN	RESPONSE
5. <u>Soil Cover and Leachate Collection and Treatment</u> PRPs are in favor of Alternative 6 for the following reasons: o Alternative 6 meets all CERCLA requirements. o Does not present technical impracticalities and adverse environmental health and safety impacts associated with Alternatives 1-5. o Less cost but just as much protection. o No risk of exposure as under excavation alternatives. o Can be implemented in 1-2 years. o Should discharge leachate to publicly-owned treatment works (POTW). Several modifications to the soil capping proposal would further increae the level of protection. In addition the FS contains an erroneous figure for the estimate of leachate flow. It does not take into account any reduction in leachate flow resulting from the soil cap proposed under Alternative 6.	A soil cover will reduce infiltration but will not minimize it. The lack of a bottom line and the inability to extract contaminated ground-water from the fractured bedrock system support the need for a more impermeable cover than the soil cover described in Alternative 6. The Beacon Falls POTW is not designed to treat industrial wastes and is currently experiencing operating problems due to infiltration/inflow. The FS did account for a decrease in the leachate flows as a result of placing the soil cover. Based on water balance calculations it was determined that this alternative may decrease the amount of leachate, but not to the level created by placement of a RCRA type cap. Based on variations in the calculation methods, the volume of leachate generation under this alternative may vary from 20,000 to 50,000 gallons per day. Although this alternative requires less material and can be implemented more quickly, it does not provide the same level of protection that would be provided by placing some variation of a RCRA cap that creates a more impermeable barrier. It does not meet CERCLA requirement since it does not provide "adequate source control" as required by the National Contigency Plan.

PRP CONCERN	RESPONSE
6. Public Water Supply Extension	
Technical basis for Alternative 9 is not clear from FS. Outer limit of potential downgradient flow of groundwater from site emcompasses a smaller area than that covered by Alternative 9. Should extend water line 4,500 linear feet along Skokorat Road and 3,200 feet along Blackberry Hill Road. This would encompass the area that could be affected.	The limits of downgradient flow cannot be fully characterized based on the nature of the fractured bedrock. Groundwater contamination has been identified along both Blackberry Hill and Skokorat Roads. Benzene levels in two of these wells have exceeded State and Federal guidelines and the other wells are clearly threatened. The limits of waterline extension proposed by the PRP's are based solely on surface topographic conditions which totally neglect the possible influence of pumping wells on local groundwater flow system boundaries and flow directions in fractured bedrock. Extension of the waterline along Skokorat Road to the next municipal water supply and along Blackberry Hill Road to the limit of residential development provides the only effective protection of public health and welfare to residents in the vicinity of the landfill.

PRP CONCERN	RESPONSE,
7. Long-Term Monitoring	
Monitoring for a full spectrum of organic and inorganic constituents is unnecessary. It is sufficient to monitor for volatile organics.	The data gathered in the remedial investigation indicate that compounds in the extractable fractions have also migrated offsite in addition to those in the volatile fraction. Furthermore, it is entirely possible that other fractions and/or heavy metals may migrate in the future due to chemical and physical processes occurring within the landfill. This cannot be predicted and, therefore, supports the need for broad spectrum testing.

PRP CONCERN	RESPONSE
8. Groundwater Treatment Further groundwater treatment at the site is not technically feasible. Treated water cannot be discharged to Hockanum Brook or accommodated by the Beacon Falls publicly-owned treatment works (POTW).	EPA is of the opinion that extraction of contaminated groundwater in deep bedrock fractures is impractical due to the impossibility of intercepting all fractures carrying contaminated groundwater. Therefore, the feasibility of treating the collected water is a moot issue.